

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/578,678	12/08/2006	Ulrich Meier	967/44780	3710
23646 7590 08/09/2007 BARNES & THORNBURG LLP			EXAMINER	
750-17TH STI			HEWITT, JAMES M	
SUITE 900 WASHINGTON, DC 20006-4675			ART UNIT	PAPER NUMBER
			3679	
			MAIL DATE	DELIVERY MODE
			08/09/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Application No.	Applicant(s)	_			
	10/578,678	MEIER ET AL.				
Office Action Summary	Examiner	Art Unit				
	James M. Hewitt	3679				
The MAILING DATE of this communication app Period for Reply	ears on the cover shee	with the correspondence address				
A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DA - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMU 36(a). In no event, however, ma will apply and will expire SIX (6) No cause the application to become	NICATION. y a reply be timely filed NONTHS from the mailing date of this communication. BABANDONED (35 U.S.C. § 133).				
Status						
1) Responsive to communication(s) filed on	· _·					
2a) ☐ This action is FINAL . 2b) ☐ This	This action is FINAL . 2b)⊠ This action is non-final.					
3) Since this application is in condition for allowan	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is					
closed in accordance with the practice under E	x parte Quayle, 1935 (C.D. 11, 453 O.G. 213.				
Disposition of Claims						
4)⊠ Claim(s) <u>8-13</u> is/are pending in the application.						
4a) Of the above claim(s) is/are withdraw	4a) Of the above claim(s) is/are withdrawn from consideration.					
5) Claim(s) is/are allowed.) Claim(s) is/are allowed.					
6)⊠ Claim(s) <u>8-13</u> is/are rejected.	☑ Claim(s) <u>8-13</u> is/are rejected.					
7) Claim(s) is/are objected to.	Claim(s) is/are objected to.					
8) Claim(s) are subject to restriction and/or	r election requirement.					
Application Papers						
9) The specification is objected to by the Examine	r					
10)⊠ The drawing(s) filed on is/are: a)□ accepted or b)⊠ objected to by the Examiner.						
Applicant may not request that any objection to the	drawing(s) be held in abe	yance. See 37 CFR 1.85(a).				
Replacement drawing sheet(s) including the correcti	·					
11) The oath or declaration is objected to by the Ex	aminer. Note the attac	ned Office Action or form PTO-152.				
Priority under 35 U.S.C. § 119						
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of:						
· — · · — ·						
2. Certified copies of the priority documents						
Copies of the certified copies of the prior	ity documents have be	en received in this National Stage				
application from the International Bureau						
* See the attached detailed Office action for a list	of the certified copies r	not received.				
Attachment(s)	1 , □ (-4. ·					
 Notice of References Cited (PTO-892) Notice of Draftsperson's Patent Drawing Review (PTO-948) 	Paper	w Summary (PTO-413) No(s)/Mail Date				
3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date <u>5/9/06</u> .	5) Notice 6) Other:	of Informal Patent Application				

Application/Control Number: 10/578,678 Page 2

Art Unit: 3679

DETAILED ACTION

Response to Amendment

The amendment to the specification filed on 5/9/06 does not comply with the requirements of 37 CFR 1.121(b). Amendments to the specification filed on or after July 30, 2003 must comply with 37 CFR 1.121 which states:

- (b) Specification . Amendments to the specification, other than the claims, computer listings (§ 1.96) and sequence listings (§ 1.825), must be made by adding, deleting or replacing a paragraph, by replacing a section, or by a substitute specification, in the manner specified in this section.
- (1) Amendment to delete, replace, or add a paragraph. Amendments to the specification, including amendment to a section heading or the title of the invention which are considered for amendment purposes to be an amendment of a paragraph, must be made by submitting:
- (i) An instruction, which unambiguously identifies the location, to delete one or more paragraphs of the specification, replace a paragraph with one or more replacement paragraphs, or add one or more paragraphs;
- (ii) The full text of any replacement paragraph with markings to show all the changes relative to the previous version of the paragraph. The text of any added subject matter must be shown by underlining the added text. The text of any deleted matter must be shown by strike-through except that double brackets placed before and after the deleted characters may be used to show deletion of five or fewer consecutive characters. The text of any deleted subject matter must be shown by being placed within double brackets if strikethrough cannot be easily perceived;
 - (iii) The full text of any added paragraphs without any underlining; and
- (iv) The text of a paragraph to be deleted must not be presented with strike-through or placed within double brackets. The instruction to delete may identify a paragraph by its paragraph number or include a few words from the beginning, and end, of the paragraph, if needed for paragraph identification purposes.
- (2) Amendment by replacement section. If the sections of the specification contain section headings as provided in § 1.77(b), § 1.154(b), or § 1.163(c), amendments to the specification, other than the claims, may be made by submitting:
- (i) A reference to the section heading along with an instruction, which unambiguously identifies the location, to delete that section of the specification and to replace such deleted section with a replacement

Application/Control Number: 10/578,678 Page 3

Art Unit: 3679

section; and;

(ii) A replacement section with markings to show all changes relative to the previous version of the section. The text of any added subject matter must be shown by underlining the added text. The text of any deleted matter must be shown by strike-through except that double brackets placed before and after the deleted characters may be used to show deletion of five or fewer consecutive characters. The text of any deleted subject matter must be shown by being placed within double brackets if strike-through cannot be easily perceived.

- (3) Amendment by substitute specification . The specification, other than the claims, may also be amended by submitting:
 - (i) An instruction to replace the specification; and
 - (ii) A substitute specification in compliance with §§ 1.125(b) and (c).

Drawings

The subject matter of this application admits of illustration by a drawing to facilitate understanding of the invention. Applicant is required to furnish a drawing under 37 CFR 1.81(c). No new matter may be introduced in the required drawing. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d).

Claim Objections

Claims 12-13 are objected to because of the following informalities:

In claim 12, line 3, "the outer one" lacks proper antecedent basis.

In claim 12, line 5, "the inner one" lacks proper antecedent basis.

Appropriate correction is required.

Application/Control Number: 10/578,678

Art Unit: 3679

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 12 and 13 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 12, lines 3-4, the phrase "the diameter of an outer one of the regions adjoining said insertion end of the corresponding to the outer diameter of the projection" is unclear and not understood.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 8 and 12-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Yeoman (US 4,800,925).

With respect to claim 8, Yeoman discloses a rapid coupling comprising a sleeve (10) having an inner stop and an insertion end; a pipe nipple (12) having an insertion end adapted to be inserted into the sleeve's insertion end and having an outer surface formed with an engagement section; a locking element (46) provided in the sleeve at the insertion end of the sleeve, the locking element, upon engagement with the

engagement section, retaining the nipple in the sleeve to constitute a coupled state of the coupling; a compression spring (86) disposed between the inner stop of the sleeve and the insertion end of the nipple. It is unclear whether in an uncoupled state of the coupling, the compression spring pushes the nipple out of the sleeve to such an extent that the engagement section is outside the sleeve. Such is dependent upon such parameters as the elastic force of the compression spring, the weight of the pipe nipple, the frictional force between the pipe nipple and socket, etc. Accordingly, it would have been an obvious matter of engineering skill and design to form the coupling such that the compression spring pushes the nipple out of the sleeve to such an extent that the engagement section is outside the sleeve in order to for example, facilitate disassembly.

With respect to claim 12, wherein the engagement section of the nipple is formed as a projection (e.g. formed to the left of ring 46 in Fig. 1), and a recess (end bore 36 and openings 56 for retaining ring 46) having two successive regions is provided in the sleeve, the diameter of the outer one of the regions adjoining said insertion end of the corresponding to the outer diameter of the projection. It is unclear as to whether the diameter of the inner one of the regions is at least equal to the outer diameter of the projection plus twice the radial thickness of the locking element. Nevertheless, it would have been an obvious matter of design choice to form the diameter of the inner one of the regions to be at least equal to the outer diameter of the projection plus twice the radial thickness of the locking element since Applicant has not disclosed that doing so is significant and for any particular purpose, and it is clear that Yeoman's device, with its given dimensions or relative dimensions, performs equally as well.

Application/Control Number: 10/578,678

Art Unit: 3679

With respect to claim 13, wherein the locking element is a resilient retaining ring having an inner diameter which, in a relieved state of the retaining ring, is smaller than the outer diameter of the projection of the nipple.

Claims 8-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Klein et al. (US 2,848,255).

With respect to claim 8, Klein et al discloses a rapid coupling comprising a sleeve (9/35) having an inner stop and an insertion end; a pipe nipple (1) having an insertion end adapted to be inserted into the sleeve's insertion end and having an outer surface formed with an engagement section (as at 41); a locking element (33) provided in the sleeve at the insertion end of the sleeve, the locking element, upon engagement with the engagement section, retaining the nipple in the sleeve to constitute a coupled state of the coupling; a compression spring (21) disposed between the inner stop of the sleeve and the insertion end of the nipple. It is unclear whether in an uncoupled state of the coupling, the compression spring pushes the nipple out of the sleeve to such an extent that the engagement section is outside the sleeve. Such is dependent upon such parameters as the elastic force of the compression spring, the weight of the pipe nipple, the frictional force between the pipe nipple and socket, weight of the seat, frictional force between the seat and socket, etc. Accordingly, it would have been an obvious matter of engineering skill and design to form the coupling such that the compression spring pushes the nipple out of the sleeve to such an extent that the engagement section is outside the sleeve in order to for example, facilitate disassembly.

Art Unit: 3679

With respect to claim 9, wherein the engagement section of the nipple is formed as a groove, and a recess (of 35) is provided in the sleeve, the recess having successive regions with diameters decreasing in an axial direction toward the insertion end of the sleeve. It is unclear as to whether the diameter of an inner one of the regions being at least equal to the outer diameter of the nipple plus twice the radial thickness of the locking element, and the diameter of a center region corresponding to the diameter of the groove plus twice the radial thickness of the locking element. Nevertheless, it would have been an obvious matter of design choice to form the diameter of an inner one of the regions to be at least equal to the outer diameter of the nipple plus twice the radial thickness of the locking element, and the diameter of a center region corresponding to the diameter of the groove plus twice the radial thickness of the locking element since Applicant has not disclosed that doing so is significant and for any particular purpose, and it is clear that Klein et al's device, with its given dimensions or relative dimensions, performs equally as well.

With respect to claim 10, wherein the diameter of an outer one of the regions of the recess is larger than the outer diameter of the nipple to leave a gap between the nipple and the sleeve for an unlocking tool to be inserted. Refer to FIG. 4.

With respect to claim 11, wherein the locking element is a resilient retaining ring having an inner diameter which, in a relieved state of the retaining ring, is smaller than the outer diameter of the nipple.

Art Unit: 3679

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to James M. Hewitt whose telephone number is 571-272-7084.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Daniel Stodola can be reached on 571-272-7087. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

JMH 8/3/07

YZ M. Z JAMES M. HEWITT PRIMARY EXAMINER